### RAW SEQUENCE LISTING PATENT APPLICATION US/08/469,641B

DATE: 03/27/98 TIME: 14:26:30

INPUT SET: S24473.raw

This Raw Listing contains the General Information Section and up to the first 5 pages.

1			SEQUENCE LISTING	
2	(1) G	eneral Information:		ENTERED
4 5 6 7 8	(i)	APPLICANT: HU, JING-S OLSEN, HEN ROSEN, CRA	RIK	
9 10 11	(ii)	TITLE OF INVENTION: PENDOTHELIAL GROWTH PRODUCING THE POLY	FACTOR 3 POLYPEPTIDE	
13	(iii)	NUMBER OF SEQUENCES:	8	
15 16 17 18 19 20 21	(iv)	CORRESPONDENCE ADDRES  (A) ADDRESSEE: STERN  (B) STREET: 1100 NEW  (C) CITY: WASHINGTON  (D) STATE: DC  (E) COUNTRY: USA  (F) ZIP: 20005	E, KESSLER, GOLDSTEIN YORK AVE, NW	I & FOX P.L.L.C.
23 24 25 26 27 28	(V)	COMPUTER READABLE FOR  (A) MEDIUM TYPE: Flo  (B) COMPUTER: IBM PO  (C) OPERATING SYSTEM  (D) SOFTWARE: Patent	ppy disk compatible	sion #1.30
29 30 31 32 33	(vi)	CURRENT APPLICATION D (A) APPLICATION NUMB (B) FILING DATE: 06- (C) CLASSIFICATION:	ER: US 08/469,641	
34 35 36 37 38	(viii)	ATTORNEY/AGENT INFORM (A) NAME: STEFFE, ER (B) REGISTRATION NUM (C) REFERENCE/DOCKET	ic K.	1
39 40 41 42 43	(ix)	TELECOMMUNICATION INF (A) TELEPHONE: 202-3 (B) TELEFAX: 202-371	71-2600	
43 44 45	(2) INFO	RMATION FOR SEQ ID NO:	1:	
46	(i)	SEQUENCE CHARACTERIST	ics:	

# RAW SEQUENCE LISTING PATENT APPLICATION US/08/469,641B

DATE: 03/27/98 TIME: 14:26:31

														II.	<b>NPUT</b>	SET:	S24473.raw
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48			(I	B) T	YPE:	nuc	leic	aci	đ								
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60		(xi	) SE	QUEN	CE D	ESCR:	IPTI	ON:	SEQ :	ID N	0:1:						
61																	
62	ATG	AGA	AGG	TGT	AGA	ATA	AGT	GGG	AGG	CCC	CCG	GCG	CCC	CCC	GGT	GTC	48
63	Met	Arg	Arg	Cys	Arg	Ile	Ser	Gly	Arg	Pro	Pro	Ala	Pro	Pro	Gly	Val	
64	1	_	_	_	5			_	-	10					15		
65							•										
66	CCC	GCC	CAG	GCC	CCT	GTC	TCC	CAG	CCT	GAT	GCC	ССТ	GGC	CAC	CAG	AGG	96
67						Val											,
68			<b></b>	20				<b></b>	25				013	30	<b></b>	9	
69				20					20					50			
70	***	CTC	CTC	ጥሮ እ	таа	ATA	CAT	CTC	ጥልጥ	እርጥ	cac	CCT	NCC.	TCC	CAG	CCC	144
71						Ile		_									144
72	цуз	Val	35	Ser	пр	116	vob	40	ıyı	1111	Arg	AIG	45	Cys	GIII	FLO	
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74 75						CCC											192
	Arg		vaı	vaı	vaı	Pro		Thr	vaı	GIU	Leu		GTA	Thr	vaı	Ата	
76		50					55					60					
77		a.a	ama	ama	<b>a</b> aa		maa	ama	<b>3</b> GM	ama	a. a	~~~	mam	~~~	~~~	maa	0.40
78						AGC											240
79		GIN	Leu	vaı	Pro	Ser	cys	vaı	unr	vaı		arg	cys	GTÀ	GTĀ	_	
80	65					70					75					80	
81											_						
82						CTG											288
83	Cys	Pro	Asp	Asp	Gly	Leu	Glu	Cys	Val	Pro	Thr	Gly	Gln	His	Gln	Val	
84					85					90					95		
85																	
86	CGG	ATG	CAG	ATC	CTC	ATG	ATC	CGG	TAC	CCG	AGC	AGT	CAG	CTG	GGG	GAG	336
87	Arg	Met	Gln	Ile	Leu	Met	Ile	Arg	Tyr	Pro	Ser	Ser	Gln	Leu	Gly	Glu	
88				100					105					110	_		
89																	
90	ATG	TCC	CTG	GAA	GAA	CAC	AGC	CAG	TGT	GAA	TGC	AGA	CCT	AAA	AAA	AAG	384
91						His											
92			115	-	-	-	_	120	•		•	,	125	4 -	•		
93																	
94	GAC	AGT	GCT	GTG	AAG	CCA	GAC	AGG	GCT	GCT	АСТ	CCC	CAC	CAC	ССТ	CCC	432
95						Pro											
96		130			-,5	0	135	9				140			y		
97		100					133					140					
98	CAC	aca	CCT	መረጥ	Gum	CCG	acc	TOO	GAG	TT CTT	acc	aaa	CCA	CCA	ccc	TO C	480
99						Pro											400
7 <b>7</b>	GTH	FIO	ALG	Set	VAI	PIO	стА	rrþ	ASD	261	WIG	PIO	GTÅ	WIG	PIO	ser	

### RAW SEQUENCE LISTING PATENT APPLICATION US/08/469,641B

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														IN	<i>IPUT</i>	SET: S	S24473.raw	
100	145					150					155					160		
101																		
102												AGG					528	
103 104	Pro	АТа	ASP	тте	165	GIN	ser	HIS	Ser	170	Pro	Arg	PIO	Leu	175	PIO		
104					103					1/0					1,3			
106	CGC	TGC	ACC	CAG	CAC	CAC	CAG	TGC	CCT	GAC	CCC	CGG	ACC	TGC	CGC	TGC	576	
107												Arg						
108	•	-		180				•	185	-		_		190	_	-		
109																		
110												GGG					624	
111	Arg	Cys	_	Arg	Arg	Ser	Phe		Arg	Cys	Gln	Gly		Gly	Leu	Glu		
112			195					200					205					
113 114	ama	220	CCA	CAC	N C C	maa.	N.C.C	mcc.	aaa	220	CTC	CGA	NGG	TCA			666	
114												Arg		IGA			000	
116	Leu	210	PIO	АБР	1111	Cys	215	Cys	AIG	цуз	пеп	220	Arg					
117		210					213					220						
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119	(2)	INF	ORMA!	rion	FOR	SEQ	ID I	10:2	:									
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126 127		•	•				-			O ID	NO:2	2:						
126		•	•			TYPI DESC	-			O ID	NO:	2:						
126 127 128	Met	(2	ĸi) S	SEQUI	ENCE	DESC	- CRIP'	NOI	: SE(	_		2: Ala	Pro	Pro	Gly	Val		
126 127 128 129	Met 1	(2	ĸi) S	SEQUI	ENCE	DESC	- CRIP'	NOI	: SE(	_			Pro	Pro	Gly 15	Val		
126 127 128 129 130 131	1	(z	Ri) S	SEQUI Cys	ENCE Arg 5	DESC	CRIP	rion Gly	: SE(	Pro 10	Pro	Ala			15			
126 127 128 129 130 131 132 133	1	(z	Ri) S	SEQUI Cys Ala	ENCE Arg 5	DESC	CRIP	rion Gly	: SE( Arg Pro	Pro 10	Pro			His	15			
126 127 128 129 130 131 132 133	1	(z	Ri) S	SEQUI Cys	ENCE Arg 5	DESC	CRIP	rion Gly	: SE(	Pro 10	Pro	Ala			15			
126 127 128 129 130 131 132 133 134 135	1 Pro	(z Arg	Arg Gln	SEQUI Cys Ala 20	Arg 5	DESC Ile Val	CRIP	rion Gly Gln	E SE( Arg Pro 25	Pro 10 Asp	Pro Ala	Ala Pro	Gly	His 30	15 Gln	Arg		
126 127 128 129 130 131 132 133 134 135	1 Pro	(z Arg	Arg Gln Val	SEQUI Cys Ala 20	Arg 5	DESC Ile Val	CRIP	Gly Gln Val	E SE( Arg Pro 25	Pro 10 Asp	Pro Ala	Ala	Gly Thr	His 30	15 Gln	Arg		
126 127 128 129 130 131 132 133 134 135 136	1 Pro	(z Arg	Arg Gln	SEQUI Cys Ala 20	Arg 5	DESC Ile Val	CRIP	rion Gly Gln	E SE( Arg Pro 25	Pro 10 Asp	Pro Ala	Ala Pro	Gly	His 30	15 Gln	Arg		
126 127 128 129 130 131 132 133 134 135 136 137	1 Pro Lys	Arg Ala Val	Arg Gln Val	Cys Ala 20 Ser	Arg 5 Pro	DESC Ile Val	Ser Ser Ser	Gly Gln Val	Arg Pro 25	Pro 10 Asp	Pro Ala Arg	Ala Pro Ala	Gly Thr 45	His 30 Cys	15 Gln Gln	Arg Pro		
126 127 128 129 130 131 132 133 134 135 136 137 138	1 Pro Lys	Arg Ala Val	Arg Gln Val	Cys Ala 20 Ser	Arg 5 Pro	DESC Ile Val	Ser Ser Ser	Gly Gln Val	Arg Pro 25	Pro 10 Asp	Pro Ala Arg	Ala Pro	Gly Thr 45	His 30 Cys	15 Gln Gln	Arg Pro		
126 127 128 129 130 131 132 133 134 135 136 137	1 Pro Lys	Arg Ala Val	Arg Gln Val	Cys Ala 20 Ser	Arg 5 Pro	DESC Ile Val	Ser Ser Asp	Gly Gln Val	Arg Pro 25	Pro 10 Asp	Pro Ala Arg	Ala Pro Ala Met	Gly Thr 45	His 30 Cys	15 Gln Gln	Arg Pro		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141	Pro Lys Arg	Arg Ala Val Glu 50	Arg Gln Val 35	Cys Ala 20 Ser	Arg 5 Pro Trp	DESC Ile Val Ile Pro	Ser Ser Asp	Gly Gln Val 40	Pro 25 Tyr	Pro 10 Asp Thr	Pro Ala Arg Leu	Ala Pro Ala Met	Gly Thr 45	His 30 Cys	15 Gln Gln Val	Arg Pro Ala		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143	Pro Lys Arg	Arg Ala Val Glu 50	Arg Gln Val 35	Cys Ala 20 Ser	Arg 5 Pro Trp	DESC Ile Val Ile Pro	Ser Ser Asp	Gly Gln Val 40	Pro 25 Tyr	Pro 10 Asp Thr	Pro Ala Arg Leu	Ala Pro Ala Met 60	Gly Thr 45	His 30 Cys	15 Gln Gln Val	Arg Pro Ala		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144	Pro Lys Arg Lys 65	Arg Ala Val Glu 50	Arg Gln Val 35 Val	Cys Ala 20 Ser Val	Arg 5 Pro Trp Val	DESC Ile Val Ile Pro	Ser Ser Asp Leu 55	Gly Gln Val 40 Thr	Pro 25 Tyr Val	Pro 10 Asp Thr Glu Val	Pro Ala Arg Leu Gln 75	Ala Pro Ala Met 60 Arg	Gly Thr 45 Gly Cys	His 30 Cys Thr	Gln Gln Val Gly	Arg Pro Ala Cys 80		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144	Pro Lys Arg Lys 65	Arg Ala Val Glu 50	Arg Gln Val 35 Val	Cys Ala 20 Ser Val	Arg 5 Pro Trp Val Pro	DESC Ile Val Ile Pro	Ser Ser Asp Leu 55	Gly Gln Val 40 Thr	Pro 25 Tyr Val	Pro 10 Asp Thr Glu Val	Pro Ala Arg Leu Gln 75	Ala Pro Ala Met 60	Gly Thr 45 Gly Cys	His 30 Cys Thr	Gln Gln Val Gly Gln	Arg Pro Ala Cys 80		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144	Pro Lys Arg Lys 65	Arg Ala Val Glu 50	Arg Gln Val 35 Val	Cys Ala 20 Ser Val	Arg 5 Pro Trp Val	DESC Ile Val Ile Pro	Ser Ser Asp Leu 55	Gly Gln Val 40 Thr	Pro 25 Tyr Val	Pro 10 Asp Thr Glu Val	Pro Ala Arg Leu Gln 75	Ala Pro Ala Met 60 Arg	Gly Thr 45 Gly Cys	His 30 Cys Thr	Gln Gln Val Gly	Arg Pro Ala Cys 80		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144 145 146 147	Pro Lys Arg Lys 65 Cys	Arg Ala Val Glu 50 Gln Pro	Ki) S Arg Gln Val 35 Val Leu Asp	Cys Ala 20 Ser Val Val	Arg 5 Pro Trp Val Pro Gly 85	DESC Ile Val Ile Pro Ser 70 Leu	Ser Ser Asp Leu 55 Cys	Gly Gln Val 40 Thr Val Cys	Pro 25 Tyr Val	Pro 10 Asp Thr Glu Val	Pro Ala Arg Leu Gln 75	Ala Pro Ala Met 60 Arg	Gly Thr 45 Gly Cys	His 30 Cys Thr Gly	Gln Gln Gly Gln 95	Arg Pro Ala Cys 80 Val		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144 145 146 147	Pro Lys Arg Lys 65 Cys	Arg Ala Val Glu 50 Gln Pro	Ki) S Arg Gln Val 35 Val Leu Asp	Cys Ala 20 Ser Val Val Asp	Arg 5 Pro Trp Val Pro Gly 85	DESC Ile Val Ile Pro Ser 70 Leu	Ser Ser Asp Leu 55 Cys	Gly Gln Val 40 Thr Val Cys	Pro 25 Tyr Val Thr	Pro 10 Asp Thr Glu Val	Pro Ala Arg Leu Gln 75	Ala Pro Ala Met 60 Arg	Gly Thr 45 Gly Cys	His 30 Cys Thr Gly His	Gln Gln Gly Gln 95	Arg Pro Ala Cys 80 Val		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144 145 146 147 148 149	Pro Lys Arg Lys 65 Cys	Arg Ala Val Glu 50 Gln Pro	Ki) S Arg Gln Val 35 Val Leu Asp	Cys Ala 20 Ser Val Val	Arg 5 Pro Trp Val Pro Gly 85	DESC Ile Val Ile Pro Ser 70 Leu	Ser Ser Asp Leu 55 Cys	Gly Gln Val 40 Thr Val Cys	Pro 25 Tyr Val	Pro 10 Asp Thr Glu Val	Pro Ala Arg Leu Gln 75	Ala Pro Ala Met 60 Arg	Gly Thr 45 Gly Cys	His 30 Cys Thr Gly	Gln Gln Gly Gln 95	Arg Pro Ala Cys 80 Val		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144 145 146 147	Pro Lys Arg Lys 65 Cys	Arg Ala Val Glu 50 Gln Pro	Ri) S Arg Gln Val 35 Val Leu Asp	Cys Ala 20 Ser Val Val Asp	Pro Trp Val Pro Gly 85	DESC Ile Val Ile Pro Ser 70 Leu	Ser Ser Asp Leu 55 Cys Glu Ile	Gly Gln Val 40 Thr Val Cys	Pro 25 Tyr Val Thr Val	Pro 10 Asp Thr Glu Val Pro 90	Pro Ala Arg Leu Gln 75 Thr	Ala Pro Ala Met 60 Arg	Gly Thr 45 Gly Cys Gln Gln	His 30 Cys Thr Gly His Leu 110	Gln Gln Gly Gln 95	Arg Pro Ala Cys 80 Val		
126 127 128 129 130 131 132 133 134 135 136 137 138 139 140 141 142 143 144 145 146 147 148 149 150	Pro Lys Arg Lys 65 Cys	Arg Ala Val Glu 50 Gln Pro	Ri) S Arg Gln Val 35 Val Leu Asp	Cys Ala 20 Ser Val Val Asp	Pro Trp Val Pro Gly 85	DESC Ile Val Ile Pro Ser 70 Leu	Ser Ser Asp Leu 55 Cys Glu Ile	Gly Gln Val 40 Thr Val Cys	Pro 25 Tyr Val Thr Val	Pro 10 Asp Thr Glu Val Pro 90	Pro Ala Arg Leu Gln 75 Thr	Ala Pro Ala Met 60 Arg Gly Ser	Gly Thr 45 Gly Cys Gln Gln	His 30 Cys Thr Gly His Leu 110	Gln Gln Gly Gln 95	Arg Pro Ala Cys 80 Val		

#### **RAW SEQUENCE LISTING** PATENT APPLICATION US/08/469,641B

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INPUT SET: S24473.raw

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153
     Asp Ser Ala Val Lys Pro Asp Arg Ala Ala Thr Pro His His Arg Pro
154
155
          130
                              135
156
     Gln Pro Arg Ser Val Pro Gly Trp Asp Ser Ala Pro Gly Ala Pro Ser
157
158
159
160
     Pro Ala Asp Ile Thr Gln Ser His Ser Ser Pro Arg Pro Leu Cys Pro
161
                      165
                                           170
162
     Arg Cys Thr Gln His His Gln Cys Pro Asp Pro Arg Thr Cys Arg Cys
163
                                       185
164
                  180
165
     Arg Cys Arg Arg Arg Ser Phe Leu Arg Cys Gln Gly Arg Gly Leu Glu
166
167
              195
                                   200
                                                       205
168
     Leu Asn Pro Asp Thr Cys Arg Cys Arg Lys Leu Arg Arg
169
170
                               215
171
172
173
     (2) INFORMATION FOR SEQ ID NO:3:
174
175
           (i) SEQUENCE CHARACTERISTICS:
                (A) LENGTH: 29 base pairs
176
177
                (B) TYPE: nucleic acid
                (C) STRANDEDNESS: both
178
                (D) TOPOLOGY: linear
179
180
181
         (ii) MOLECULE TYPE: cDNA
182
183
184
185
          (xi) SEQUENCE DESCRIPTION: SEQ ID NO:3:
186
187
188
     GCATGGATCC CAGCCTGATG CCCCTGGCC
                                                                               29
189
      (2) INFORMATION FOR SEQ ID NO:4:
190
191
           (i) SEQUENCE CHARACTERISTICS:
192
                (A) LENGTH: 30 base pairs
193
194
                (B) TYPE: nucleic acid
195
                (C) STRANDEDNESS: both
196
                (D) TOPOLOGY: linear
197
          (ii) MOLECULE TYPE: cDNA
198
199
200
201
202
203
          (xi) SEQUENCE DESCRIPTION: SEQ ID NO:4:
204
                                                                               30
205
     GCATTCTAGA CCCTGCTGAG TCTGAAAAGC
```

### RAW SEQUENCE LISTING PATENT APPLICATION US/08/469,641B

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INPUT SET: S24473.raw

```
206
207
     (2) INFORMATION FOR SEQ ID NO:5:
208
           (i) SEQUENCE CHARACTERISTICS:
209
                (A) LENGTH: 29 base pairs
210
                (B) TYPE: nucleic acid
211
                (C) STRANDEDNESS: both
212
                (D) TOPOLOGY: linear
213
214
215
          (ii) MOLECULE TYPE: cDNA
216
217
218
219
          (xi) SEQUENCE DESCRIPTION: SEQ ID NO:5:
220
221
                                                                                29
     GACTGCATGC ACCAGAGGAA AGTGGTGTC
222
223
     (2) INFORMATION FOR SEQ ID NO:6:
224
225
           (i) SEQUENCE CHARACTERISTICS:
226
                (A) LENGTH: 29 base pairs
227
                (B) TYPE: nucleic acid
228
229
                (C) STRANDEDNESS: both
230
                (D) TOPOLOGY: linear
231
         (ii) MOLECULE TYPE: cDNA
232
233
234
235
236
237
          (xi) SEQUENCE DESCRIPTION: SEQ ID NO:6:
238
                                                                                29
     GACTAGATCT CCTTCGCAGC TTCCGGCAC
239
240
      (2) INFORMATION FOR SEQ ID NO:7:
241
242
           (i) SEQUENCE CHARACTERISTICS:
243
244
                (A) LENGTH: 14 amino acids
245
                (B) TYPE: amino acid
                (C) STRANDEDNESS: single
246
                (D) TOPOLOGY: Not Relevant
247
248
          (ii) MOLECULE TYPE: peptide
249
250
251
252
253
254
          (xi) SEQUENCE DESCRIPTION: SEQ ID NO:7:
255
           Pro Xaa Cys Val Xaa Xaa Xaa Arg Cys Xaa Gly Cys Cys Asn
256
                           5
                                                10
257
           1
258
```

## SEQUENCE VERIFICATION REPORT PATENT APPLICATION US/08/469,641B

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